

144953

M E M O R A N D U M

DATE: December 6, 1991
TO: Division File
FROM: Michael D. Grant *MDG*
SUBJECT: 1631210009 - St. Clair Co. - CWM-Trade Waste Incineration
ILD098642424
FOS

On December 5, 1991, I visited the subject facility to obtain information regarding the burning of dioxin in one of the facility's incinerators. The facility reported this situation to the Agency on December 4, 1991. Upon arrival, I met with Dennis Warchol, Ray Smiley, and Wayne Fischer.

On December 3, 1991 at 9:15 p.m., 25 mg of 2, 3, 7, 8 Tetrachlorodibenzo-P-Dioxin was incinerated in a lab pack in the Unit #3 incinerator. The following is my understanding of the events leading up to the incineration of the dioxin waste.

Controlled Waste, Division of Chemical Waste Management, Menomonee Falls, Wisconsin, was contracted by the Wisconsin Department of Agriculture Research Lab to collect, package and ship lab chemicals for disposal. The materials were shipped to TWI on September 6, 1991 and received at the facility on September 16, 1991 with Controlled Waste listed as the generator (See manifests listed as Attachment A). Receiver number 2-0239 was assigned to the waste contained on the manifest. This number is listed on the lower right hand corner of the manifest (Attachment A). As described to me by the TWI representatives, Controlled Waste used the list given to them by the Wisconsin Department of Agriculture. Controlled Waste scrutinized the list provided to determine any chemicals which could not be shipped to TWI. Line 7 of Attachment B is blacked out. I was told this was a container of Silvex which was not taken from the site because TWI is not permitted for this material. However, the actual bottles were not scrutinized, just the list.

The container inventory sheet (Attachment B) sent to TWI by Controlled Waste listed the lab chemicals contained in the 55 gallon drum. Line 5 lists 30-10 gram bottles of "Pesticide Samples containing Organo Chlorine". I was told the 25 mg bottle of dioxin was one of these 30 bottles. The waste, after arriving at TWI, was scheduled for repacking with the Technical Services Division so the 55 gallon drum could be broken down into burnable containers.

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11 DEC 1991

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The procedure utilized by Technical Services at TWI is to list the chemical names from the bottles on the container inventory sheet for the drum charge being prepared. The employee listed the chemicals contained in Receiver #2-0239-17-1. The 17 represents drum number 17 and the 1 represents charge #1 of drum 17. Attachment C is the container inventory sheet prepared by the repacker at TWI. Line 4 lists 25 mg of 2, 3, 7, 8 Tetrachlorodibenzo-P-Dioxin. The repacker did not recognize this waste as a non-permitted waste. This receiver was then placed on the burn plan. The repacks were moved to the incinerator #3 dock for processing on 12/3/91. At 21:15 (9:15 p.m.), charge receiver #2-0239-17-1 was incinerated. Attachment D is the solids charge log for wastes charged into the incinerator. The underlined charge contained the subject waste. This charge weighed 30.7 lbs.

However, as I was reviewing the paperwork on December 6, 1991, the identifier code listed on the Attachment B-Container Inventory is listed as WCR20. This is apparently for drum #20 listed on the manifest. I called Wayne Fischer and informed him of this and he told me it would be investigated and would call me back. At 4:30 p.m. on December 6, 1991, I received a phone call from Ray Smiley and Wayne Fischer. The container associated with the WCR20 inventory sheet was assigned receiver number 2-0239-17 at TWI. The numbers are assigned as the drums are unloaded at the site. Per Mr. Smiley, drum #20 was removed first and assigned the first corresponding drum number (17-See Section J, Item B, on the manifest). Per the TWI representatives, the documentation provided to me was correct as to the drum containing the 2, 3, 7, 8 Tetrachlorodibenzo-P-Dioxin lab solution.

The approval chemist who reviews the lab repack inventory sheets caught the chemical listed on Attachment C and immediately notified other TWI representatives. However, it was after the fact and it was determined that the container had already been incinerated. Per Ray Smiley, measures have already been taken to prevent any future incidents of waste being incinerated prior to review by the approval chemists.

Upon discovery, all waste feeds for Unit #3 were shut down. This occurred at 11:30 a.m. on 12/4/91. The incinerator was rammed out at 7:00 a.m. on 12/4/91 and again at 11:30 a.m. after the waste feeds were shut down. Ramming out the incinerator is the process of engaging the ash ram to remove any ash collected in the belly of the incinerator. The hoppers containing the ash generated during this time were identified and the pneumatic tanker which collects the baghouse dust was also removed and segregated. There is approximately 20,000 pounds of dry scrubber solids in the pneumatic tanker. Per TWI representatives, the 4 hoppers were emptied into 7 85-gallon drums and the tanker brakes were initially disabled to prevent any accidental usage of it.

Waste feeds on Unit #3 were then started again at approximately 8:30 p.m. on December 4, 1991. We then discussed sampling and analytical procedures. TWI was proposing to sample the ash and baghouse dust generated at the time of the incident and the ash generated after the unit started up again. I also suggested that the ash pit water be analyzed. They agreed.

I then went to the facility to observe the sampling. The first sample was taken from the ash hopper generated after the unit began burning waste again. This sample was identified as 12/5/91 ash. A composite sample was taken from the ash hopper. The second sample was taken from the metal container holding dry scrubber solids (baghouse dust). The dust was from the pneumatic tanker generated during the incident and was labeled as 12/3/91 Dry Scrubber Solids. The third sample taken was of the ash pit water and labeled as 12/5/91 ash pit water. The fourth sample collected was a composite of the seven drums of ash generated at the time of the incident. This sample was identified as 12/3/91 ash.

I also informed TWI that all residue generated since they began feeding after the incident should remain separated until sample verification results are received back indicating that the ash hopper generated 12/5/91 is clean. Ray Smiley agreed and instructed the appropriate officials that all ash generated from Unit #3 is to be kept segregated until further notice.

Through TWI's investigation, it was determined that the 2, 3, 7, 8 Tetrachlorodibenzo-P-Dioxin was a lab standard used by the Wisconsin Dept. of Agriculture Research Lab for calibration of the GC/MS. This verification came from personnel at the Wisconsin Dept. of Agriculture. As a result, this chemical is not an F026 or F027 waste. This chemical is not a RCRA hazardous waste and is not included in Section VIII, Table I (Attachment E) of the facility's March 31, 1988 Part B Permit. Table I lists "Waste Which Shall Not Be Received or Incinerated at Trade Waste Incineration". If this material had been a F-waste, all associated residuals would be listed and the incinerator would have to be shut down and RCRA closed.

MDG:cas/0742L
Attachments

cc: Glenn Savage
cc: Bill Child
cc: Doug Clay
cc: Charles Northrup
cc: Bill Ingersoll
cc: Jim Cobb
cc: Collinsville-DLPC
cc: Collinsville-DAPC

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NOTE: FORM DESIGNED TO PRINT 6 LINES PER INCH.

UNIFORM HAZARDOUS WASTE MANIFEST		1. Generator's US EPA ID No.		Manifest Document No. 29591		2. Page 1 of		Information in the shaded areas is not required by Federal law, but is required by Illinois law.	
3. Generator's Name and Mailing Address CONTROLLED WASTE DIVISION W124 N9451 BOUNDARY ROAD MENDOTA, ILL. 61351				Location if Different:		A. Illinois Manifest Document Number IL4387772 MANIFEST FEE PAID			
4. Generator's Phone: 255-6655				5. Transporter 1 Company Name CHEMICAL WASTE MANAGEMENT, INC.		6. US EPA ID Number		B. Illinois Generator's ID	
7. Transporter 2 Company Name CHEMICAL WASTE MANAGEMENT, INC.				8. US EPA ID Number		C. Illinois Transporter's ID		D. (708) 396-1050 Transporter's Phone	
9. Designated Facility Name and Site Address TRADE WASTE INCINERATION 87 MOBILE DRIVE SAUGET, ILLINOIS 62201				10. US EPA ID Number		E. Illinois Transporter's ID		F. (708) 396-1050 Transporter's Phone	
				11. US DOT Description (Including Proper Shipping Name, Hazard Class, and ID Number)		12. Containers		13. Total Quantity	
						No. Type		14. Unit wt/vol	
a. WASTE FRAMMABLE SOLID NOS. 1 Flammable Solid UN1325 SH 110 2555						002 DM 001110		1 G	
b. WASTE ORM-H NOS. ORM-H, NH 1693 CSH 112 2555						004 DM 000230		1 G	
c. WASTE POISON B LIQUID NOS. Poison B UN2810 (mercury salts, Dimeric)						001 DM 00055		1 G	
d. WASTE POISON B SOLID NOS. Poison B UN2811 (mercury salts, Gamm. salts)						001 DM 00055		1 G	
J. Additional Descriptions for Materials Listed Above A) WCR 15, 16 D) WCR 22 B) WCR 17-20 C) WCR 21				K. Handling Codes for Wastes Listed Above to item # 14 1 - Gallons 2 - Cubic Yards					
15. Special Handling Instructions and Additional Information IN EVENT OF AN EMERGENCY CONTACT CHEMICAL WASTE MANAGEMENT, INC. AT 205/654-4711									
16. GENERATOR'S CERTIFICATION: I hereby declare that the contents of this consignment are fully and accurately described above by proper shipping name and are classified, packed, marked, and labeled, and are in all respects in proper condition for transport by highway according to applicable international and national government regulations. If I am a large quantity generator, I certify that I have a program in place to reduce the volume and toxicity of waste generated to the degree I have determined to be economically practicable and that I have selected the practicable method of treatment, storage, or disposal currently available to me which minimizes the present and future threat to human health and the environment; OR, if I am a small quantity generator, I have made a good faith effort to minimize my waste generation and select the best waste management method that is available to me and that I can afford.									
Printed/Typed Name Garry Leake				Signature Garry Leake		Date 8/10/91			
17. Transporter 1 Acknowledgement of Receipt of Materials Printed/Typed Name Tadell K... JEP				Signature Tadell K... JEP		Date 8/10/91			
18. Transporter 2 Acknowledgement of Receipt of Materials Printed/Typed Name Gerald M. Cade				Signature Gerald M. Cade		Date 8/10/91			
19. Discrepancy Indication Space									
20. Facility Owner or Operator: Certification of receipt of hazardous materials covered by this manifest except as noted in item 19. Printed/Typed Name Garry Leake									
				Signature Garry Leake		Date 8/10/91			

The Agency is authorized to require, pursuant to Illinois Revised Statutes, Chapter 111 1/2 Section 21, that this information be submitted to the Agency. Failure to provide the information may result in a civil penalty against the owner or operator of not to exceed \$25,000 per day of violation. Failure to submit this information may result in a fine up to \$50,000 per day of violation and imprisonment up to 5 years. This form has been approved by the Illinois Department of Transportation.

COPY 3, TSD COPY

2-0239

In case of a spill call the Illinois Office of Emergency Response at 217/782-3637 and the National Response Center at 800/424-0802 or 202/426-2676.



CHEMICAL WASTE MANAGEMENT
TECHNICAL SERVICES DIVISION - MIDWEST REGION
CONTAINER INVENTORY

Attachment B

2-2039-17-1

CONTAINER TYPE 55 gallon

GENERATOR NAME Controlled Waste

IDENTIFIER CODE WCR 20

PROJECT NO. 62090

WM PROFILE NO. AD 2885

DATE 9/13/91

MANIFEST NO. _____

FIELD ANALYST _____

LAB PACK TYPE. APPENDIX ☐ IV, ☐ V or ☒ ALL OTHER WASTE

HAZARD CLASSIFICATION ORM-A

QUANTITY	DESCRIPTION (All wastes are considered "Nonhazardous" unless "Wastewater" precedes description)	EPA HAZARD CODE	SUB- CATEGORY	LAND BAN REGULATIONS				COMMENTS (INC. PPA, ETC.)
				1-200.41 (b) 2-200.42 (b)	SPECIFIED TECHNOLOGY 200.43 (b)	1-200.44 2-200.45	3-200.46	
4x1 gal	WASTE 2,4 Dichloroacetic Acid	U240	None	2				
3x1 gal	WASTE 2,4 Dichloroacetic Acid	U240	None	2				T-30
1x1 lb	WASTE Lindane	U129	None	2				
1x1 lb	WASTE Methylene Chloride	U242	None	2				
2x10 gal	WASTE Pesticide residues containing							
	WASTE Oregano Chlorine	NR	None					
	WASTE [REDACTED]							
	WASTE [REDACTED]							6
1x25 gal	WASTE Chlordane	U036	None	2				
2x25 gal	WASTE Bromacil	NR	None					
2x25 gal	WASTE Bladex Pesticide	NR						
2x25 gal	WASTE Dieldrin	POST	None					
2x25 gal	WASTE D,P DDT	U060	None					
3x25 gal	WASTE P,P DDT	U061	None	2				
2x25 gal	WASTE Heptachlor	POST	None	2				
2x25 gal	WASTE malathion							
	WASTE							
	WASTE							
	WASTE							
	WASTE							
	WASTE							
	WASTE							

LAB PACK REPACK

Attachment C

GENERATOR NAME _____

PROJECT NO _____

DATE _____

FIELD ANALYST _____

HAZARD CLASSIFICATION

[illegible]

INC.	TIME	BASE CHARGE	RECV	DRUM	REPACK	WEIGHT
INC.3	20:59:55	BASE CHARGE	RECV 22299	DRUM	9	29.7 LBS
INC.2	20:59:14	BASE CHARGE	RECV 11118	DRUM	0	82.2 LBS
INC.3	21:00:52	BASE CHARGE	RECV 22299	DRUM	9	30.6 LBS
INC.2	21:00:54	BASE CHARGE	RECV 11118	DRUM	0	109.6 LBS
INC.3	21:01:50	BASE CHARGE	RECV 22299	DRUM	9	38.2 LBS
INC.2	21:01:53	BASE CHARGE	RECV 11118	DRUM	0	52.2 LBS
INC.2	21:02:52	BASE CHARGE	RECV 11118	DRUM	0	64.9 LBS
INC.2	21:03:52	BASE CHARGE	RECV 11118	DRUM	0	51.8 LBS
INC.2	21:04:50	BASE CHARGE	RECV 11118	DRUM	0	52.6 LBS
INC.2	21:05:49	BASE CHARGE	RECV 22299	DRUM	4	27.4 LBS
INC.2	21:06:48	BASE CHARGE	RECV 22299	DRUM	10	24.3 LBS
INC.3	21:07:52	BASE CHARGE	RECV 22299	DRUM	9	34.2 LBS
INC.3	21:08:58	BASE CHARGE	RECV 22299	DRUM	9	14.1 LBS
INC.2	21:08:35	BASE CHARGE	RECV 22299	DRUM	8	25.3 LBS
INC.3	21:09:56	BASE CHARGE	RECV 22299	DRUM	9	28.1 LBS
INC.3	21:10:54	BASE CHARGE	RECV 22299	DRUM	9	40.8 LBS
INC.2	21:10:24	BASE CHARGE	RECV 22299	DRUM	7	24.4 LBS
INC.3	21:11:51	BASE CHARGE	RECV 22299	DRUM	9	28.1 LBS
INC.3	21:12:49	BASE CHARGE	RECV 22299	DRUM	9	32.1 LBS
INC.2	21:12:12	BASE CHARGE	RECV 22299	DRUM	6	31.7 LBS
INC.3	21:13:43	BASE CHARGE	RECV 22299	DRUM	9	18.1 LBS
INC.3	21:14:44	BASE CHARGE	RECV 20239	DRUM	17	32.8 LBS
INC.2	21:14:16	BASE CHARGE	RECV 22299	DRUM	9	34.9 LBS
INC.3	21:15:42	BASE CHARGE	RECV 20239	DRUM	17	30.7 LBS
INC.2	21:16:26	BASE CHARGE	RECV 22299	DRUM	12	21.9 LBS
INC.3	21:17:24	BASE CHARGE	RECV 20239	DRUM	17	37.8 LBS
INC.3	21:18:22	BASE CHARGE	RECV 20239	DRUM	17	38.7 LBS
INC.2	21:18:10	BASE CHARGE	RECV 22299	DRUM	5	21.7 LBS
INC.3	21:19:19	BASE CHARGE	RECV 20239	DRUM	19	38.9 LBS
INC.2	21:19:53	BASE CHARGE	RECV 22299	DRUM	1	19.8 LBS
INC.3	21:20:17	BASE CHARGE	RECV 20239	DRUM	16	46.5 LBS
INC.3	21:21:15	BASE CHARGE	RECV 20239	DRUM	19	19.8 LBS
INC.2	21:21:32	BASE CHARGE	RECV 22299	DRUM	11	23.5 LBS
INC.3	21:23:52	BASE CHARGE	RECV 20239	DRUM	17	41.2 LBS
INC.2	21:23:32	BASE CHARGE	RECV 22299	DRUM	3	31.3 LBS
INC.3	21:24:49	BASE CHARGE	RECV 20239	DRUM	19	43.9 LBS
INC.2	21:25:34	BASE CHARGE	RECV 22299	DRUM	2	27.4 LBS
INC.3	21:26:13	BASE CHARGE	RECV 20239	DRUM	15	34.2 LBS
INC.3	21:27:11	BASE CHARGE	RECV 20239	DRUM	15	42.2 LBS
INC.2	21:27:29	BASE CHARGE	RECV 22299	DRUM	16	28.4 LBS
INC.2	21:29:26	BASE CHARGE	RECV 22299	DRUM	20	20.6 LBS
INC.3	21:31:16	BASE CHARGE	RECV 20239	DRUM	15	29.8 LBS
INC.2	21:31:07	BASE CHARGE	RECV 22299	DRUM	24	25.9 LBS
INC.2	21:32:59	BASE CHARGE	RECV 22299	DRUM	19	26.6 LBS
INC.3	21:33:39	BASE CHARGE	RECV 20239	DRUM	15	36.5 LBS
INC.2	21:34:51	BASE CHARGE	RECV 22299	DRUM	23	30.7 LBS
INC.3	21:36:25	BASE CHARGE	RECV 20239	DRUM	15	37.0 LBS
INC.2	21:36:54	BASE CHARGE	RECV 22299	DRUM	15	32.0 LBS
INC.2	21:38:58	BASE CHARGE	RECV 22299	DRUM	18	29.1 LBS
INC.3	21:39:13	BASE CHARGE	RECV 20239	DRUM	15	37.2 LBS

Attachment E



ILD098642424
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Section VIII

Part B Permit
Issued 3/3/88

TABLE 1

Wastes Which Shall Not be Received or Incinerated
At Trade Waste Incineration

Hazardous Waste Number	Compound	Reason
P009	Ammonium picrate	Compressed gas
P031	Cyanogen	Compressed gas
P033	Cyanogen chloride	Compressed gas
P056	Fluorine	Compressed gas
P063	Hydrogen cyanide	Compressed gas
P095	Phosgene	Compressed gas
P096	Phosphine	Compressed gas
U134	Hydrogen fluoroide	Compressed gas
F020	Tri-, or tetrachlorophenols	Dioxins
F021	Pentachlorophenol	Dioxins
K001	Pentachlorophenol	Dioxins
F022	Tetra-, penta-, or hexachlorobenzenes	Dioxins
F023	Tri-, or tetrachlorophenols	Dioxins
F026	Tetra-, penta-, or hexa- chlorobenzenes	Dioxins
F027	Tri-, tetra-, or pentachlorophenols	Dioxins
F028	Soils/residues from F020-F027	Dioxins
U121	Trichloromonofluoromethane	$H_c < 0.24 \text{ kcal/gr}$

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Attachment E (C.I.)



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Hazardous Waste Number	Compound	Reason
U225	Tribromomethane (Bromoform)	H _c <0.24 kcal/gr
U075	Dichlorodifluoromethane	H _c <0.24 kcal/gr
	Asbestos Wastes	Carcinogen
	Polychlorinated biphenyls (PCB) greater than 50 ppm	Dioxins
	"Source, special nuclear, or by product material as defined by the Atomic Energy Act of 1954, 42 U.S.C. 2011 et seq. or radioactive material discarded in accordance with III. Rev. Stat. ch. 111 1/2, Sec. 230.1 et seq."	

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DATE: December 5, 1991

TIME: 10:30-12:00

I.D. 1631210009

St. Clair County

TWI

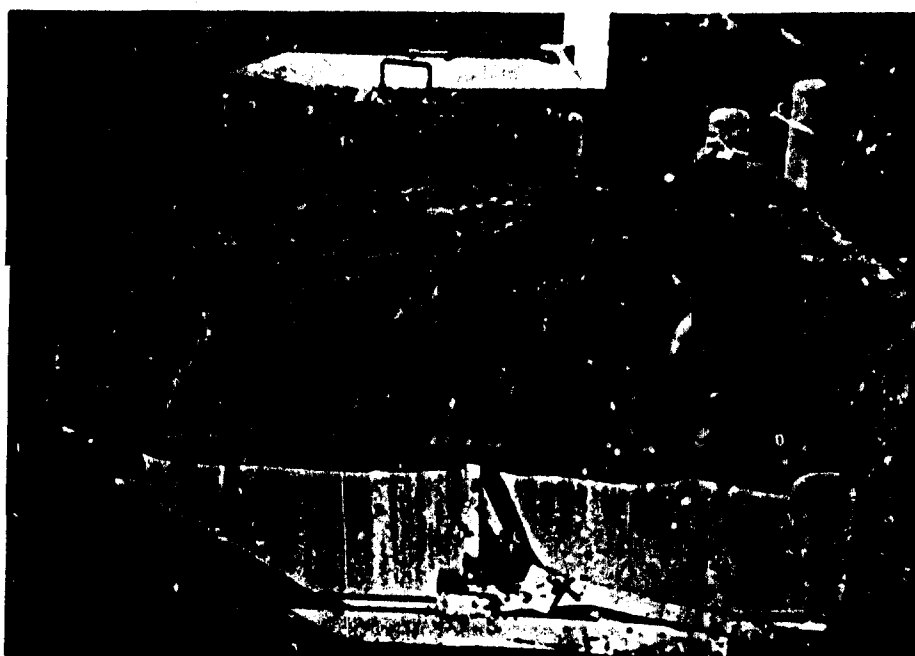
PHOTOGRAPH TAKEN TOWARD THE:

West

ROLL# 1750 PHOTO# 1

PHOTOGRAPH BY:

J. D. [Signature]



DATE: December 5, 1991

TIME: 10:30-12:00

I.D. 1631210009

St. Clair County

TWI

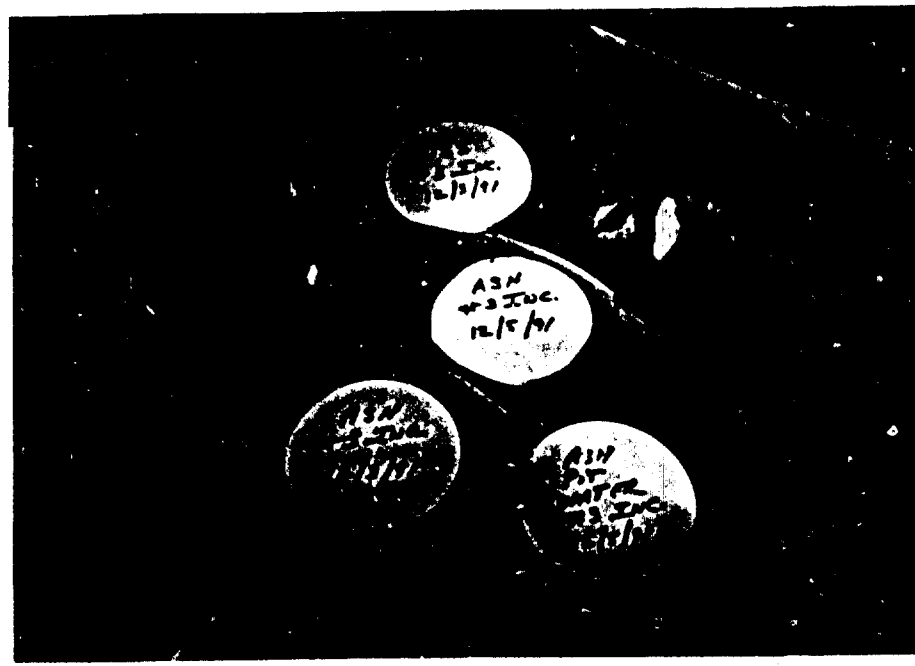
PHOTOGRAPH TAKEN TOWARD THE:

Southwest

ROLL# 1750 PHOTO# 2

PHOTOGRAPH BY:

J. D. [Signature]



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19 DEC 1991

IEPA/DLPC

DATE: December 5, 1991

TIME: 10:30-12:00

I.D. 1631210009

St. Clair County

TWI

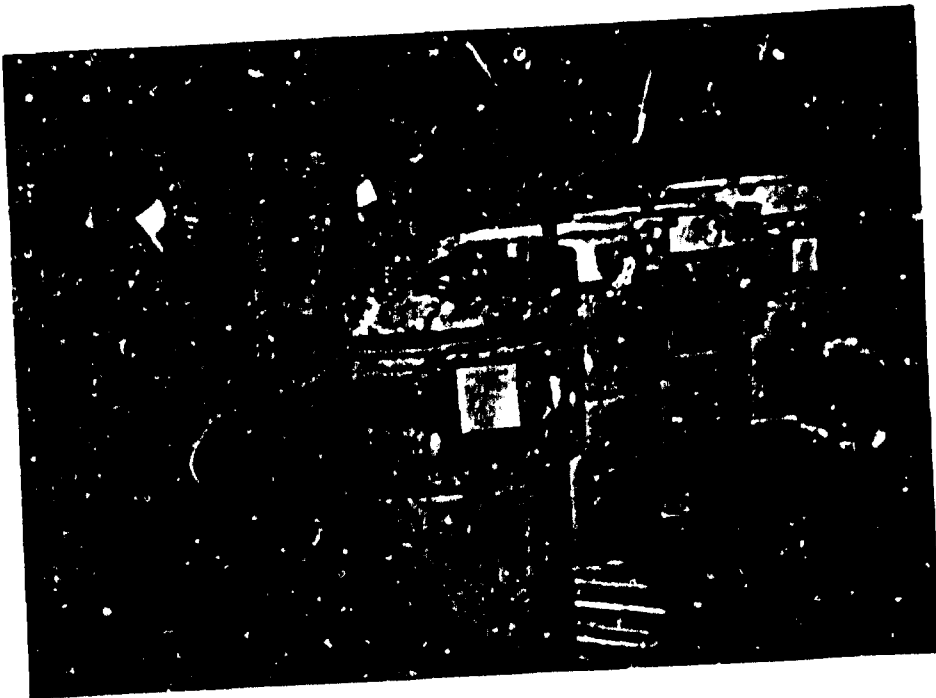
PHOTOGRAPH TAKEN TOWARD THE:

North Northwest

ROLL# 1750 PHOTO# 3

PHOTOGRAPH BY:

[Signature]



DATE: December 5, 1991

TIME: 10:30-12:00

I.D. 1631210009

St. Clair County

TWI

PHOTOGRAPH TAKEN TOWARD THE:

Northwest

ROLL# 1750 PHOTO# 4

PHOTOGRAPH BY:

[Signature]

